

ABSTRACT

In a system for transmitting a three-dimensional (3-D) digital image over a communication network, in response to a client computer generating a request for interaction with a 3-D image stored on an image storage device, a server computer performs two-dimensional sub-band transform decompositions in x-axis and y-axis directions upon the 3-D image, performs a one-dimensional sub-band transform decomposition in a z-axis direction upon a portion of the two-dimensionally transform-decomposed digital image, and progressively transmits to the client computer data representing a region of interest specified in the client request.